UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/524,961	09/28/2005	Jeffrey Wilson	DYOUP0286US	3621

23908   7590   12/11/2007
RENNER OTTO BOISSELLE & SKLAR, LLP
1621 EUCLID AVENUE
NINETEENTH FLOOR
CLEVELAND, OH 44115

EXAMINER
BROOKS, SHANNON

ART UNIT	PAPER NUMBER
2617	

MAIL DATE	DELIVERY MODE
12/11/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

PTOL-90A (Rev. 04/07)

	Application No.	Applicant(s)
Office Action Summary	10/524,961	WILSON, JEFFREY
	Examiner	Art Unit	
	Shannon R. Brooks	2617	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on <u>28 September 2005</u>.

2a)☒ This action is **FINAL.**   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) <u>1-15, 19-35 and 39-42</u> is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) <u>1-15, 19-35, and 39-42</u> is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on <u>28 September 2005</u> is/are: a)☒ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☒ All b)☐ Some * c)☐ None of:

        1.☒ Certified copies of the priority documents have been received.

        2.☐ Certified copies of the priority documents have been received in Application No. _____.

        3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1)☐ Notice of References Cited (PTO-892)

2)☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3)☐ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date _____.

4)☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____ .

5)☐ Notice of Informal Patent Application

6)☐ Other: _____.

DETAILED ACTION

Response to Arguments

1.   Applicant's arguments filed 8/6/07 have been fully considered but they are not

persuasive.

The Applicant argues in Remarks that the Bennett reference does not teach a mobile

originated (MO) format. The Applicant defines MO messages in Remarks (3rd paragraph) as

"..messages that have not previously passed through an SMSC providing a store-and-forward

function for the network". However, this definition is not supported in the specification. The

Applicant discusses MO messages in [0010], [0031], [0115], [183], and [197] and nowhere does

the Applicant state that MO messages are messages that have not previously passed through an

SMSC providing a store-and-forward function for the network. The Examiner reads a MO

message as a message that originates at the mobile and is sent toward the network. The Bennett

reference (Fig. 1 and [0019]-[0025]), teaches three users (items 12, 14, and 16 of Fig. 1)

originating SMS messages over the Web, by WAP phone, and by MO SMS phone across the

network to end user 20. Note that user 16 is shown in Fig. 1 and described in [0023] as using a

Mobile Originating (MO) SMS phone. Therefore, Bennett clearly meets the claim limitations of

a method and a means to support execution of one or more messaging applications, wherein an

application may be executed for each of any messages that arrive at the apparatus in a mobile

originating format as amended by the Applicant in Claims 1 and 21.

Additionally, the Applicant is arguing that Bennett is actually teaching a mobile

termination message format (Figs. 1-3) because the central server is arranged to receive

messages from Short Message Service Centers (SMSCs) which provide message store and

forward functions for the attached mobile networks; and that this contrast with a

telecommunication service wherein the apparatus supporting the execution of the messaging

application is located in the mobile originating path of the MO path of the message routing.

However, this definition of mobile termination is also not supported in the specification. The

Applicant discusses MT messages in [0011], [0031], [0115], and [0197] and nowhere does the

Applicant state that MT messages are created when the central server is arranged to receive

messages from Short Message Service Centers (SMSCs) which provide message store and

forward functions for the attached mobile networks. Bennett teaches that communication paths

are bi-directional (supporting originations and terminations, Pg. 2, [0020]). The Examiner reads a

MT messages as a message that is received from the network by the mobile. Therefore, Bennett

clearly reads on the claim limitations of an apparatus or a method wherein the response message

is in mobile terminated form as amended by the Applicant in claims 13 and 33.

The applicant argues that Bennett can not be combined with other references because it

would not have been obvious to place the central server of Bennett in the MO path of the

message routing because this would prevent Bennett from performing its intended function-

namely to improve connectivity between the outputs of SMSCs using different standartds. The

Examiner respectfully disagrees. Bennett properly places the central server (router) in the Mobile

origination path (Note that user 16 in Fig. 1 and described in [0023]) is properly placing a mobile

originated call and that the server (router) is essential in Bennett's network operations (Pg. 2,

[0024], and Pg. 3, [0038]-[0046] and Pg. 5, [0061]-[0065]).

Other references are exemplary references from relevant subclasses and, alone or in

combination, read upon the argued claim limitations as set forth in the following office action.

Claim Rejections - 35 USC § 103

1.   The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2.   The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148

USPQ 459 (1966), that are applied for establishing a background for determining

obviousness under 35 U.S.C. 103(a) are summarized as follows:

    1.   Determining the scope and contents of the prior art.
    2.   Ascertaining the differences between the prior art and the claims at issue.
    3.   Resolving the level of ordinary skill in the pertinent art.
    4.   Considering objective evidence present in the application indicating obviousness or nonobviousness.

3.   **Claims 1-5, 7-8, 10, 12-15, 21-25, 27-28, 30, 32-35, and 41-42** are rejected

under 35 U.S.C. 103(a) as being unpatentable over Bennett (US 2002/0112041 A1) in

view of Allison (US 2003/0083078 A1).

Consider **Claim 1**, Bennet teaches telecommunications services apparatus for use with a

telephone network, the apparatus comprising: means operable to support execution of one or

more messaging applications, wherein an application may be executed for each of any or all

messages that arrive at the apparatus **(Pg. 5, [0062])** in a mobile originated format **(Fig. 1, item**

16 and Pg. 2, [0019]-[0024]); means for storing message attributes **(read as server, Pg. 5,**

[0062]) matched to respective messaging applications **(read as different types of sources for**

message creation, Pg. 5, [0062] and Pg. 5, [0069]); means for comparing, for each message, an

attribute of that message with the stored message attributes, and operable thereby to select the

respective messaging application on the basis of the comparison **(read as broker, translator, or**

reformatter, Pg. 5, [0062]); and means for executing the selected messaging application,

execution of the selected application including processing, transforming **(read as voice-to-email**

or email-to-voice) and/or routing the respective message **(Pg. 4, [0050]-[0052])**.

Bennett does not specifically and definitively teach an attribute. However, Allison

teaches an attribute **(Pg. 2, [0016])**.

Therefore, it would have been obvious to one skilled in the art at the time of the invention to

incorporate the teaching of Allison into Bennet to aid in the identification of a sending or

receiving party **(Pg. 2, [0016])**.

Consider **Claim 21**, Bennett teaches a telecommunications services method for a

telephone network, the method comprising: supporting execution of one or more messaging

applications, wherein an application may be executed for each of any or all input messages **(Pg.**

5, [0062]) received in a mobile originated format **(Fig. 1, item 16 and Pg. 2, [0019]-[0024])**;

storing message **attributes (read as stored in server, Pg. 5, [0062])** matched to respective

messaging applications **(read as different types of sources for message creation, Pg. 5, [0062]**

and Pg. 5, [0069]); comparing, for each message, an attribute of that message with the stored

message attributes, and thereby selecting the respective messaging application on the basis of the

comparison **(read as broker, translator, or reformatter, Pg. 5, [0062])**; and executing the

selected messaging application, execution of the selected application including processing,

transforming **(read as voice-to-email or email-to-voice)** and/or routing the respective message

(Pg. 4, [0050]-[0052]).

Bennett does not specifically and definitively teach an attribute. However, Allison

teaches an attribute **(Pg. 2, [0016])**.

Therefore, it would have been obvious to one skilled in the art at the time of the invention

to incorporate the teaching of Allison into Bennet to aid in the identification of a sending or

receiving party **(Pg. 2, [0016])**.

Consider **Claim 2**, Bennett teaches apparatus, wherein the message attributes include

destination address **(Pg. 3, [0032] and [0047, and Pg. 4, [0049] and [0057])**.

Consider **Claim 3**, Bennett teaches apparatus, wherein the message attributes include

destination address type **(Pg. 3, [0040] and [0043], Pg. 4, [0057], Pg. 5, [0062], and Pg. 5,**

Table 1).

Consider **Claim 4**, Bennett teaches apparatus, wherein the message attributes include

originating address **(Pg. 4, [0052] and Pg. 8, [0094])**.

Consider **Claim 5**, Bennett teaches apparatus, wherein the message attributes include

originating address type **(read as MIN, phone number, or email address, Pg. 4, [0052] and**

Pg. 8, [0094, and Pg. 5, [0062] and Table 1].

Consider **Claim 7**, Bennett teaches apparatus, wherein the message attributes include

message content **(Pg. 7, [0086]-[0087])**.

Consider **Claim 8**, Bennett teaches apparatus, comprising at least one SMS router for

routing messages to the means operable to support execution of one or more messaging

applications **(Fig. 1, Blocks 18 and 26c)**.

Consider **Claim 10**, Bennett teaches apparatus, comprising a message transformation

means for parsing, interpreting and transforming message content and addressing in order to

generate a response message **(Pg. 4, [0050]-[0052] and Pg. 5, [0062] and [0069])**.

Consider **Claim 12**, Bennet teaches apparatus, wherein the response message is routed

via the SMS router **(read as server 24, Pg. 5, [0062])**.

Consider **Claim 13**, Bennett teaches apparatus, wherein the response message is in

mobile terminated form **(read as a received message from the network, Pg. 2, [0025])**.

Consider **Claim 14**, Bennet teaches apparatus, wherein the response message is routed

over a data network **(Pg. 2, [0025] and Pg. 4, [0053])**.

Consider **Claim 15**, Bennett teaches apparatus, wherein the message transformation

means is operable to return a response message back to the original sender without requiring a

routing query to a home location register (HLR), the response addressing and routing

information being derived from the original message **(Pg. 5, [0069]**.

Consider **Claim 22**, Bennett teaches a method according to claim 21, wherein the

message attributes include destination address **(Pg. 3, [0032] and [0047, and Pg. 4, [0049] and

[0057])**.

Consider **Claim 23**, Bennett teaches a method according to claim 21, wherein the

message attributes include destination address type **(Pg. 3, [0040] and [0043], Pg. 4, [0057], Pg. 5, [0062], and Pg. 5, Table 1)**.

Consider **Claim 24**, Bennett teaches a method according to claim 21, wherein the message attributes include originating address **(Pg. 4, [0052] and Pg. 8, [0094])**.

Consider **Claim 25**, Bennett teaches a method according to claim 21, wherein the message attributes include originating address type type **(read as MIN, phone number, or email address, Pg. 4, [0052] and Pg. 8, [0094, and Pg. 5, [0062] and Table 1]**.

Consider **Claim 27**, Bennett teaches a method, wherein the message attributes include message content **(Pg. 7, [0086]-[0087])**.

Consider **Claim 28**, Bennett teaches a method according to claim 21, including routing messages via at least one SMS router for execution of one or more messaging applications **(Fig. 1, Blocks 18 and 26c)**.

Consider **Claim 30**, Bennett teaches a method according to claim 21, comprising a message transformation step for parsing, interpreting and transforming message content and addressing in order to generate a response message **(Pg. 4, [0050]-[0052] and Pg. 5, [0062] and [0069])**.

Consider **Claim 32**, Bennett teaches a method, wherein the response message is routed via the SMS router **(read as server 24, Pg. 5, [0062])**.

Consider **Claim 33**, Bennett teaches a method according to claim 30, wherein the response message is in mobile terminated form **(read as a received message from the network, Pg. 2, [0025])**.

Consider **Claim 34**, Bennett teaches a method, wherein the response message is routed

over a data network (**Pg. 2, [0025] and Pg. 4, [0053]**).

Consider **Claim 35**, Bennett teaches a method according to claim 30, wherein the

message transformation step is operable to return a response message back to the original sender

without requiring a routing query to a home location register (HLR), the response addressing and

routing information being derived from the original message (**Pg. 5, [0069**.

Consider **Claim 41**, Bennett teaches a computer program for implementing a method

according to claim 21 (**Fig. 1a**).

Consider **Claim 42**, Bennet teaches a storage medium storing a computer program

according to claim 41 (**Fig. 1a**).

4.   **Claims 6, 11, 19-20, 26, 31, and 39-40** are rejected under 35 U.S.C. 103(a) as

being unpatentable over Bennett (US 2002/0112041 A1) in view of Allison (US

2003/0083078 A1) and further in view of McCann (US 2001/0029182 A1).

Consider **Claim 6**, Bennett teaches apparatus, except that it does not specifically teach

the apparatus wherein the message attributes include signaling fields.

However, McCann teaches the apparatus wherein the message attributes include

signaling fields (**Pg. 8, [0069]**).

Therefore, it would have been obvious to one skilled in the art at the time of the invention

to incorporate the teaching of McCann into Bennett in order to aid in processing (**Pg. 8, [0069]**).

Consider **Claim 11**, Bennett teaches apparatus, except that it does not specifically teach

the apparatus wherein the response message is generated according to a programmable table of exceptions.

However, McCann teaches the apparatus wherein the response message is generated according to a programmable table of exceptions **(Pg. 8, [0069]).**

Therefore, it would have been obvious to one skilled in the art at the time of the invention to incorporate the teaching of McCann into Bennett in order to aid in the processing of signaling messages **(Pg. 8, [0069]).**

Consider **Claim 19**, Bennett teaches apparatus, except that it does not specifically teach the apparatus wherein the routing query is an SRI-SM MAP message.

However, McCann teaches the apparatus wherein the routing query is an SRI-SM MAP message **(Pg. 4, [0042] and Fig. 13)**.

Therefore, it would have been obvious to one skilled in the art at the time of the invention to incorporate the teaching of McCann into Bennett in order to determine if access to the requested node is actually necessary **(Pg. 10, [0085])**.

Consider **Claim 20**, Bennett teaches apparatus, except that it does not specifically teach the apparatus wherein the routing information obtained from the original message is in the form of an international mobile subscriber identifier (IMSI) and a visitor location register (VLR) address corresponding to the sender's location.

However, McCann teaches the apparatus wherein the routing information obtained from the original message is in the form of an international mobile subscriber identifier (IMSI) and a visitor location register (VLR) address corresponding to the sender's location **(Pg. 6, [0054]).**

Therefore, it would have been obvious to one skilled in the art at the time of the invention

to incorporate the teaching of McCann into Bennett in order to facilitate directing signaling

messages (Pg. 6, [0054]).

Consider **Claim 26**, Bennett teaches a method, except that it does not specifically teach a

method wherein the message attributes include signalling fields.

However, McCann teaches a method wherein the message attributes include signaling

fields (Pg. 8, [0069]).

Therefore, it would have been obvious to one skilled in the art at the time of the invention

to incorporate the teaching of McCann into Bennett in order to aid in processing (Pg. 8, [0069]).

Consider **Claim 31**, Bennett teaches a method, except that it does not specifically teach a

method wherein the response message is generated according to a programmable table of

exceptions.

However, McCann teaches the method wherein the response message is generated

according to a programmable table of exceptions (Pg. 8, [0069]).

Therefore, it would have been obvious to one skilled in the art at the time of the invention

to incorporate the teaching of McCann into Bennett in order to aid in the processing of signaling

messages (Pg. 8, [0069]).

Consider **Claim 39,** Bennett teaches a method, except that it does not specifically teach a

method wherein the routing query is an SRI-SM MAP message.

However, McCann teaches the method wherein the routing query is an SRI-SM MAP

message (Pg. 4, [0042] and Fig. 13).

Therefore, it would have been obvious to one skilled in the art at the time of the invention to incorporate the teaching of McCann into Bennett in order to determine if access to the requested node is actually necessary (Pg. 10, [0085]).

Consider **Claim 40**, Bennett teaches a method, except that it does not specifically teach a method wherein the routing information obtained from the original message is in the form of an international mobile subscriber identifier (IMSI) and a visitor location register (VLR) address corresponding to the sender's location.

However, McCann teaches the method wherein the routing information obtained from the original message is in the form of an international mobile subscriber identifier (IMSI) and a visitor location register (VLR) address corresponding to the sender's location **(Pg. 6, [0054])**.

Therefore, it would have been obvious to one skilled in the art at the time of the invention to incorporate the teaching of McCann into Bennett in order to facilitate directing signaling messages **(Pg. 6, [0054])**.

5.   **Claims 9, and 29** are rejected under 35 U.S.C. 103(a) as being unpatentable over Bennett (US 2002/0112041 A1) in view of Allison (US 2003/0083078 A1) and further in view of Khello (US 7027582 B2).

Consider **Claim 9,** Bennett teaches apparatus, except that it does not specifically teach an apparatus including an SMS service control point (SCP) such that service logic may operate in the SMS router in conjunction with centralised intelligence in the SMS SCP.

However, Khello teaches teach an apparatus including an SMS service control point (SCP) such that service logic may operate in the SMS router in conjunction with centralised intelligence in the SMS SCP **(Col. 7, lines 37-57).**

Therefore, it would have been obvious to one skilled in the art at the time of the invention to incorporate the teaching of Khello into Bennett in order to provide an intelligent network trigger **(Col. 7, lines 37-57).**

Consider **Claim 29**, Bennett teaches a method, except that it does not specifically teach a method wherein service logic may operate in the SMS router in conjunction with centralised intelligence in an SMS service control point (SCP).

However, Khello teaches ~~teach~~ a method wherein service logic may operate in the SMS router in conjunction with centralised intelligence in the SMS SCP **(Col. 7, lines 37-57).**

Therefore, it would have been obvious to one skilled in the art at the time of the invention to incorporate the teaching of Khello into Bennett in order to provide an intelligent network trigger **(Col. 7, lines 37-57).**

Conclusion

6.   **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period

will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

however, will the statutory period for reply expire later than SIX MONTHS from the mailing

date of this final action.

Any response to this Office Action should be **faxed to** (571) 273-8300 **or mailed to**:

Commissioner for Patents

P.O. Box 1450

Alexandria, VA 22313-1450

Hand-delivered responses should be brought to

Customer Service Window

Randolph Building

401 Dulany Street

Alexandria, VA 22314

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Shannon Brooks whose telephone number is (571) 270-1115.

The examiner can normally be reached on Monday - Friday, 8:00 a.m. - 5:00 p.m., EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Charles Appiah can be reached on (571) 272-7904. The fax phone number for the

organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

applications is available through Private PAIR only. For more information about the PAIR

system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR

system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Shannon R. Brooks

October 18, 2007

CHARLES N. APPIAH
SUPERVISORY PATENT EXAMINER